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# Relationship of Knowledge Management with Creativity of School Managers

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#### **ABSTRACT**

Purpose of this research examines the relationship between knowledge management with creativity of school manager. The research method was descriptive from type of correlation. Statistical population included 220 people from manager of pre-university and high school in Rasht in 2011-2012 academic years that were selected by stratified random sampling. Tools for data collection questionnaire of knowledge management were with 33 items and creativity questionnaire with 50 items. Questionnaire of knowledge management made based on Lawson questionnaire (2003) and was adjusted according to population desired and was with range of four-degree Likert. Both questionnaire in term of face and content validity were confirmed by experts. Also was validated by using Cronbach's alpha coefficient was calculated and confirmed relibility of knowledge and creativity questionnaire. A total of 160 questionnaires distributed, 140 questionnaires were returned between managers of target population. For data analysis was used correlation coefficient, multiple linear correlations by SPSS statistical software. The results showed that there is positive and significant relationship between knowledge management and it dimensions include knowledge creation, knowledge acquisition, knowledge organizing, knowledge storage, knowledge dissemination, and application of knowledge with creativity. Also results of stepwise regression analysis showed that knowledge management (collection factors together) has effect on creativity and it has predictive power of the criterion variable. Determination coefficient showed that about 42% of creativity variabile could be explained by knowledge management.

KEYWORDS: Knowledge Management, Creativity, Managers, Schools

#### 1. INTRODUCTION

In new era with rapid expansion of human knowledge create a new chapter in human life and the future developments of the world and in resulting management in organizations, especially educational institutions is important. Training manager especially school managers due to contact with, children, adolescents and youth of any nation that are making future, it has the key role and very critical, thus according to characteristics, knowledge and their skills and how to improve these skills for playing their effective role in management of school is very important. Considering that creativity is required to growth and dynamism of person and ultimately organizations. Thus need to be creative manager to the survival of organizations and increase its productivity is undeniable necessary; because creative manager with identifying creative individuals and to provide field for their creativity development and or innovative use of environment, resources and employees in organizations can play an important role in promoting the objectives of the organization. Today's successful organizations are constantly thinking of new ideas and different approaches have been proposed to enhance the creativity apply in organizations and this is possible by creative manager and employees (Hajipour & Akbarzadeh, 2009).

Creativity is to create something new and unique concept in a way that is relevant and useful cause solving a problem, question or need for scientific, industrial or social (Pirkhaefi, 2004). Terms of Luthans (1995) creativity is a combination of solutions by individuals or groups in a new way. Moorhead & Griffin (1989) creativity considered the process of to create clear imagination and original perspectives from situation. In terms of them having creator and producer mind through the imagination and to discover situations is called creativity and Important its indicator is strength of the mind in case of the form of phenomena and states in mind.

They the four major functions are attached for creative minds: creating a new product or service, 2. created a new application of a new product or service, 3. Solve a problem, 4. Resolve a dispute conducted research in psychology and other sciences shows that although the creative process may be genetically and inherited, but it can be trained (Ahmadabadi, 2008).

Important reasons of creativity for manager from vision Janparvar (1994) include: creative manager can more likely help towards creativity from themselves and the school under the management of themselve deal with difficulties and take advantage of opportunities. 2. Manager to teachers trusted in providing new ideas and new initiatives and urges them. 3. With greater creativity manager and his colleagues, increased quality and quantity decisions and thus students are better educated (Aminbidokhti & et al, 2006).

In education and training, school management know the most important agents of change and innovation in education, because teaching and learning that is central to all activities of education and training so much is done in school (Longman,1985). Therefore, evaluation of influencing factors on innovation and creativity among school

managers of the country is the principle of integral management of any dynamic system (Quote from Niknani et al, 2009). On the other hand, studies show that position of creativity and innovation depends on multiple factors that most their fundamental can named existence effective and updated organizational knowledge base and identify of quickly and accurately opportunities and threats facing the organization (Raghib & Siadat, 2008).

Considering nowadays role and importance of knowledge as one of the most important assets of organizations, is well-known role. Therefore, its management to the success of people and finally organizations has high importance. Some researcher (Wisberg, 1994) speakfrom positive relationship between knowledge and creativity and they believe that having high creativity should devote much time for the internalizing knowledge in organization (Nonaka, Quote from Alavi & Leidner, 1999). With invented term the knowledge economy by Peter Drucker in the late sixties, considering growing importance knowledge as organization capital was started in international conferences and texes (Stewartz et al, 2000). Kong & Pondia (2003) believe that study of knowledge can be traced back to Plato and Aristotle (Quote from Amirkhani, 2005). Mainly two types of knowledge have been found as explicit knowledge and tacit knowledge in the literature; explicit knowledge, refers to knowledge that can easily be recorded, express in the form of apprehensible and exchange in the form of text, computer output, spoken or written words or other ways (Nonaka, Quote from Alavi & Leidner, 1999).

Knowledge or personal knowledge refers to processed information in individuals mind and so capturing, storage, express and distribution is difficult (Polany, 1966 Quote from Alavi & Leidner, 1999). Currently most of the added value achieved by the organizations by knowledge nor the equipment and material, so charls hendi, the leading theorist of management believes that we are now at a stage where the value of intellectual capital of companies often is several times a material property. Therefore knowledge management or art of creating added value of these intangible assets is as a very influential parameter of particular importance and value. Knowledge is general body of learning and skills that people (not machines) are employed to solve the problem (Quote from Aryazand, 2010). Organizations will knowledgebased in the future and will include professionals that route and their work rules set based on feedback received from colleagues, customers and manager. Accordingly focus getting used to labor can change from physical workers to knowledge workers that resist in front of behavioral approach that one hundred years ago, the business environment was a military environment, and will appeared a change in organizational activities (Drucker, 2000). Knowledge management is not new posts, it can be said for hundreds of years ago that owners of family firms, traders, farmers and other jobs have transferred their skills to their children and students; knowledge management has also been made. However, many studies of knowledge management in recent decades as increasing have been attention (.Swartz, 2003, Quote from Abtahi & Salavati, 2005). But the first time term knowledge management was used in a management conference in Europe in 1986 (Wiig, 1997). Interest in knowledge management, despite the label "follow fad" is growing (Ubogu, Amanoo & Azubuike, 2001). Basically what do need and necessity exists to exploit this knowledge in an educational organization? These are Questions that may existence for practitioners an educational organization. Can be education like other areas has undergone knowledge management and in order to survive in today's changing conditions should be able to be served knowledge management fellow professional. In the knowledge era, knowledge is considered the most important factor in the long term success of individuals and organizations. Collection of knowledge in many areas such as library resource centers of documents, databases, knowledge bases, archives, and also in human mind and around organizations is dispersed. Optimal utilization of distributed collections to produce new information and knowledge is required knowledge management process (Ghoreishi, Ahmadi, 2008).

The many and varied definitions of knowledge management has been presented that few of them are listed here. In idea of Gupta, et al (2000) knowledge management is the process that helps to the organizations to find, select, organizing, disseminate and transfer important information and expertise necessary for activities such as problem solving, dynamic learning, strategic planning and decision making (Quote from Lawson,2003). in idea of polton (1999) Knowledge management is knowledge integrating, knowledge sharing, evaluating, accumulated knowledge and ultimately develop and maintain skills throughout the organization (Quote from Binder & Fish,2001). King (2002) knowledge management knows as the process of creating, organizing, and distributing necessary information for understands a particular task. Lawson (2003) the cycle of knowledge management with a combination and implementation phases of Wigg; Horwitch &Armacost (2002) Parikh (2001) is divided to six different processes of knowledge creation, knowledge acquisition, knowledge organization, knowledge storage, knowledge dissemination, and knowledge application and this process is defined as follows:

**Knowledge creation:** in this step organization trying to search and difinition of knowledge and related resources as a conscious from inside and outside of organization. Knowledge is created through the discovery, means employees are developing new ways of doing things or it is given through external sources.

**Knowledge acquisition:** new knowledge identified as relevant and valuable for future needs and to rational and reasonable manner are extracted wherever it be readily available and shares, is presented.

**Knowledge organizing:** New knowledge is refined and organized. This process is done through filter for passing and identifying. Means beneficial aspects of knowledge are listed for different products and services. Knowledge is placed in a way that is practical and can be reviewed and will be kept current and relevant.

**Knowledge Storage:** Codified knowledge is stored in a suitable format, so that others in this organization can have access to it. Database management and data storage technologies can help in this process.

**Knowledge Dissemination:** At this step, individual knowledge in a useful format for dealing with the specific needs of the users is distributed.

**Knowledge Application:** Knowledge can be used to new situations in which users can learn and produce new knowledge. In learning process should exist analysis and critical assessment to create new patterns and knowledge for future use.

#### 2. Investigation of Relationship between Knowledge Management and Creativity Process

Today concept of knowledge management and creativity is evident in organizational and social studies and economy today seems more likely to have knowledge and knowledge known as much as the core concept in understanding the market and organizations. However, that creativity is closely correlated with the knowledge, ability to be an important source of organizational effectiveness and is a source of competitive advantage of organization. Information system (IS) support from knowledge creation and sharing it in the organization and more research is about organizational knowledge management and it role. The importance of creativity in knowledge increase the use of information systems as support organizational knowledge, all of them find the important research about the relationship between knowledge and creativity in organization (Ansari, 2011).

To convert wisdom to the ability or in other words become creativity to innovation, knowledge management model provides fields that It can described creation of the knowledge, insight, and understanding how to use the knowledge and technology with a mix of modern knowledge times by using management principles in the new century and new methods of teaching (Behrangi & Safaei Fakhri, 2009, p1).

According to Nonaka (quoted by Mousaovi and others, 2009) organizational knowledge develops through social interaction between implicit knowledge and explicit knowledge. He considering basic assumption that knowledge as the main assets of the organization is required coordination and integration by creating dynamic interaction between these two types of knowledge to the four basic strategies of the social (tacit knowledge to tacit knowledge), externalzing (from tacit knowledge to explicit knowledge), composition (explicit knowledge to explicit knowledge), internalizing (explicit knowledge to tacit knowledge) refers to the process of knowledge conversion. In this way the organization will be able to create and develop new knowledge. Knowledge created through spiral process in levels of vertical and horizontal developed and is caused to create a new cycle of knowledge. This interactive process occurs at the level of internal organization. Customer behavior with acceptance, purchase, their use or unwilling to use goods or services is caused concept in product; then it acts as a stimulus to extract tacit knowledge. Then knowledge reflected in organization creative process and begins a new loop of organizational knowledge.

By applying the knowledge management we can recognize the lack of the knowledge in organization that lead to increasing customer satisfaction and employee. However, knowledge management is caused to reduce duplication and save time and to stimulate creativity (Sayadzadeh, Mirshah Jafari, 2008).

Creativity is field of the development and innovation. Sometimes new ideas and thoughts of individual minds will seeps and in later years by another person are manifested as innovation in product or service. Knowledge management experts believe that mechanisms of innovation and knowledge management processes are adaptable (Dehghan Najm, 2009).

The decision making in creativity process strongly depends on the tacit knowledge technology. Consequently, tacit knowledge plays an important role in all stages of the innovation process. It is clear that at all stages of the innovation process (discovered and developed the idea) increase intangible and invisible. Therefore, tacit knowledge plays an important role in every stage of creativity process. Based on studies performed inference that tacit knowledge is necessary in order the ability of maximize the success of creativity and innovation accepted in line with innovation management in organization and on three different dimensions of tacit knowledge (development, survival and transmission of tacit knowledge) is emphasized. Whatever relevant tacit knowledge in various stages of the creative process be entered, Innovation management will be operate efficiently and effectively that this can lead to increase creativity success (Fathian & et al, 2005).

As Cao (1997) says, having a good strategy for working with knowledge management issues is not enough. The relationship between these two organizations allows remaining in the future. The outcome creativity of business will be depends on the type created between knowledge management and base skills and management creativity (Quoting Martenson, 2000). Runco says, creativity is creation of relationship between new ideas and new knowledge. Experience, skills and information is called as the knowledge; but in future of creative process is called knowledge and individuals' creativity will be measured by how to use knowledge (Sarchehani, Jahani, 2011).

#### **Related & Similar Research**

After investigation and study to collect results and summary from research conducted in Iran and other countries research topic which is exactly identical with the subject of this thesis was not find, but a brief summary of closest research conducted that are in agreement with topics of this study, to be mentioned in here.

Pak Keung. (2006). In doctoral thesis from Hong Kong university with title "can creativity be learned: a knowledge management approach to creativity support." It was concluded that creativity is the starting point innovation and organizational creativity is a function of individual creativity.

Criscuolo et al (2010) in research showed that the creative multinational companies in addition to use of research have better communications with retailers, suppliers and universities and are also benefiting from the knowledge.

Loaeo et al (2010) (Quoted from Ansari, 2010) in research among 362 manufacturing units in China, observed positive relationship between knowledge acquisition and increase organization creativity.

Hind (2008) (Quoted from Niknami et al, 2009) in research to the examines the relationship and the role of knowledge management with creativity and innovation in higher education centers came to the conclusion that knowledge management variables have positive effects, direct and significant on creativity and innovation variables and creativity and knowledge management variables explain 25% variance in total to the innovation.

Nayer & jokar (2012) in research with title "relationship between knowledge management and creativity among librarians in academic libraries in Shiraz" in 2010 concluded that between knowledge management and creativity, there is positive and significant correlation coefficient 0.261 at the level of 0.013 and between component scores of people and culture in knowledge management of librarians with their creativity score there isn't a significant relationship and gender, work experience and education of librarians has no significant effect on creativity.

Ansari (2011) in research with title" knowledge management and creativity in physical education department of Tehran province" concluded that knowledge management and creativity in general office is average and there is positive and significant relationship between knowledge management and creativity and among four dimensions of knowledge management, externalizing and socializing has a significant relationship with creativity.

Samadian & Seyed Alavi (2011) in research with title "the effect of knowledge management on creativity rate of TV and radio organization employee in Tehran" reached the conclusion that knowledge management and its components (knowledge sharing, knowledge organizing, application of knowledge, knowledge performance evaluation, discovery and knowledge creation) have effect on creativity and increasing the knowledge management and each of its components increases creativity.

Niaz azari et al (2011) in research with title "Investigate the role of knowledge management on creativity of manager in secondary schools" reached the conclusion that there is a relationship between knowledge management, knowledge organizing, knowledge application and knowledge dissemination with creativity of teachers but there is no relationship between knowledge perception and teachers creativity. Also impact of knowledge management isn't different on the creativity female and male teachers.

Ansari (2010) in research with title "knowledge management and creativity in the Olympic Committee" reached the conclusion that Knowledge management and creativity in the Olympic Committee is average and there are positive significant relationship between knowledge management and creativity, and also there is a significant relationship between the four dimensions of knowledge management, externalizing and socializing with creativity and it is predictor of this variable.

Abbasi Mosloo et al (2009) in research with title "Investigate the role of knowledge management in public organizations to improve employee creativity (Case study: Hospital Sadoughi) reached the conclusion that there is a significant relationship between creativity and organizational knowledge management in among knowledge workers of hospital There are a significant and positive correlation between creativity and organizational knowledge acquisition, Registration of the organizational knowledge, organizational knowledge transfer, organizational knowledge creation and application of organizational knowledge.

Saeeda Ardakani et al (2008) in research with title "Investigate of the correlation rate between commitment to knowledge management and employee creativity (case study: Yazd University employee) reached the conclusion that There are significant correlation between knowledge management and creativity, There are overlap between the characteristics of creative people and committed people to knowledge management.

Rahimi et al (2011) in research with title "surveying relationship between knowledge management process and creativity among faculty members in Esfahan University" reached the conclusion that there are positive and significant correlation between the dimensions of knowledge management and creativityand there aren't significant difference between mean of knowledge management in faculty members in term of age, gender and field of study and also between mean of the creativity rate of faculty members in terms of age, education and employment status.

Objective of this study is investigation the relationship between knowledge management and creativity of school management in pre-university and high school. In this regard, the following hypothesis is proposed:

The hypotheses of the present study were as follows:

- 1. There is relationship between knowledge management and creativity of schools managers.
- 1-1- There are relationship between knowledge creation and creativity of schools managers.
- 1-2- There are relationship between knowledge acquisition and creativity of schools managers.
- 1-3- There are relationship between Knowledge organizing and creativity of schools managers.
- 1-4- There are relationship between knowledge storage and creativity of schools managers.
- 1-5- There are relationship between knowledge dissemination and creativity of schools managers.
- 1-6- There are relationship between knowledge application and creativity of schools managers.

# 3. RESEARCH METHODOLOGY

# 3.1. Research Method

In this study, the research methods in terms of objective, is applied and terms collecting specific information and to investigate their relationship is descriptive correlation.

#### 3.2. Statistical population and sample size

Statistical population of this study included school managers of pre-university and high school for girls and boys in Rasht in the 91-90 academic year that is divided into two regions 1 and 2 and included 220 people. Sample size was calculated by the formula Cochran 140 people. For sampling with stratified random method from regions 1 and 2 were

calculated the number of manager separately males and females. Then in each of region separately sections and the males and females were determined share of samples and then considering share of each region according to the ratio of men and women randomly selected some schools and their manager were selected for implementation of questionnaires. A total of 160 questionnaires were distributed among the sample. A total of 160 questionnaires distributed, 140 questionnaires were returned that rate of response is quite suitable for this type of study.

#### 3.3. Research tools

**Creativity of manager:** Creativity questionnair of randsyp was with 50 items that Cronbach's alpha for creativity questionnair of randsyp was calculated 0.938.

**Knowledge management of manager:** knowledge management tools for data collection were a questionnaire with 33 items that made based on questionnaire Lawson (2003) and was adjusted according to population desired. This tools can be measured the six dimensions of knowledge management means knowledge creation, knowledge acquisition, knowledge organizing, knowledge storage, knowledge dissemination, knowledge application. Degree of agreement was measured in all dimensions based on four degree Likert scale based (very high, high, low, and very low). Face validity and content of both questionnaires was confirmed by experts. Relaibility of the questionnaire was measured by using Cronbach's coefficient that Cronbach calculation results are given in Table 1.

Table 1 - Questionnaire	Cronba	ch al	pha
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Variable	Number of questions	calculated Cronbach alpha
Knowledge Creation	5	0.859
knowledge Acquisition	6	0.792
Knowledge Organizing	4	0.816
knowledge Storage	4	0.863
knowledge Distribution	8	0.889
Knowledge Application	6	0.850
Knowledge Management (total)	33	0.964
Creativity	50	0.938

#### 4. DATA ANALYSIS

The data was analyzed by descriptive statistics (frequency, percentage, mean, and standard deviation) and inferential statistics (correlation coefficient, multiple linear correlations) by using SPSS statistical software.

#### 4.1. RESEARCH FINDINGS

Demographic characteristics of respondents are summarized in Table 2. As can be seen, 40 percent of respondents were male and 60 percent were women. Also, 80 percent of them had Bachelor and 17.9 of them had Master. It is considered about work experience that 17.1 percent of them 11-15 years of experience, 43.6 with experience of 16-20 years and 33.6 of them were over 20 years experience.

Table 2 - Demographic data of respondents

Pariographic data of respondents				
Features	Frequency	Frequency Percent		
Gender				
Male	56	40		
Female	84	60		
Education				
Bachelor	112	80		
Master	25	17.9		
Unanswered	3	2.1		
Experience				
11-15	24	17.1		
16-20	61	43.6		
>20	47	33.6		
Unanswered	8	5.7		

Table 3 - Descriptive statistics for characteristics of the sample group members

Component	Mean	Standard deviation	
1.Creativity	49.30	30.57	
2.Knowledge Creation	3.09	0.66	
3Knowledge Acquisition	3.05	0.61	
4.Knowledge Organizing	3.07	0.71	
5.Knowledge Storage	2.89	0.66	
6.Knowledge Distribution	2.84	0.76	
7.Knowledge Application	2.98	0.67	
8.Knowledge Management	2.99	0.59	

As can be seen in table, creativity mean was equal to 49.30 with a standard deviation of 30.57. This number is represented that the mean of respondents creativity is average and mean of knowledge management 2.99 with a standard deviation of 0.59 indicates that the mean of knowledge management of school managers is higher than average. Among the components of knowledge management variables are also related to knowledge creation variables with the highest mean of 3.09 with a standard deviation of 0.66 and the lowest mean related to knowledge dissemination variable with mean 2.84 with a standard deviation of 0.76. The relationship between knowledge management and creativity through Pearson correlation coefficients were determined. The results are shown in Table 4. As the can see that between knowledge management and creativity of school manager, there is a significant positive relationship.

Table 4 - Results of the correlation between knowledge management dimension (independent variables) and creativity

Number of Hypotheses	Dimensions	Variable	Rate
1	Knowledge Management (total)	R	0.651
		Sig	0.000
		N	140
1-1		R	0.562
	Knowledge Storage	Sig	0.000
		N	140
2-1	Knowledge Acquisition	R	0.570
		Sig	0.000
		N	140
3-1	Knowledge Organizing	R	0.573
		Sig	0.000
		N	140
4-1	Knowledge Storage	R	0.601
		Sig	0.000
		(N	140
5-1	Knowledge Distribution	R	0.532
		Sig	0.000
		N	140
6-1	Knowledge Application	R	0.590
		Sig	0.000
		N	140

Table 5 - Table of regression analysis coefficients and evaluate the potential significant prediction for variables Model Summary: R=0.651

sig= 0.000 F=101.615 st.error=23.278 Adjust R=0.420 R<sup>2=</sup>0.424

Model	Component	Unstandardized Coefficients		Standard coefficients		
		(B)	Std. Error	Beta	t	Sig
1	Constant	-50.183	10.063		-4.987	0.000
	Knowledge Management	33.238	3.297	0.651	10.080	0.000

Predictors: (Constant), Knowledge Management dependent variables: creativity

## 5. DISCUSSION AND CONCLUSION

1. First hypothesis: There is relationship between knowledge management and creativity of schools managers.

The findings suggest that there is significant positive relationship between knowledge management and creativity of schools managers. (p=0.000 r=0.651).so creative increase, if knowledge management increae. Regression analysis also shows that knowledge management variable explain about 42 percent of the variance (P=0.000, R<sup>2</sup>=0.424). Knowledge management has the predictive power of creativity result of peresent study is consistent with result of Naier & Jokar (2012):Ansari(2011):Samadian & Seved Alavi (2011):Ansari (2010):Niazazari & et al (2011):Abbasi Mosloo (2009); Saeeda Ardakani & et al (2008); Rahimi & et al (2012). The results of all of these studies indicate that there is significant positive relationship between knowledge management and creativity. Also according to Niknami and others (2009), the results Hynd (2008) and Amani (2008) also showed a significant positive relationship between knowledge management and creativity that so results of this study is consistent with their research. Furthermore, in a study conducted by Niknami and others (2009) results one of the hypotheses showed variables of organizational culture, organizational learning and knowledge management has a direct effect and relationship, significant with creativity variable of schools managers in Tehran. Then this study also showed that there is a positive and significant relationship between knowledge management and creativity that is consistent with present study. In explaining this finding can be said that knowledge management is one of effective factors on the creativity of school managers, means implementation of knowledge manager to can help to enhance knowledge management of managers to their creativity maximizing that is in line with achieving the goals of of education.

2. Second hypothesis: There is relationship between knowledge creation and creativity of schools managers.

The findings suggest that there is significant positive relationship between knowledge creation and creativity of schools managers (p=0.000, r=0.562); so creative increase, if knowledge creation increae. The results of this study are consistent with result of Samadian & Seyed Alavi (2011); Abbasi Mosloo & et al (2009). The results of all of these studies show that there is positive and significant relationship between knowledge creation and creativity. In explaining this finding can be said that knowledge creation can provide field for in creating new ideas or creativity.

3. Third hypothesis: There is relationship between knowledge acquisition and creativity of schools managers.

The findings suggest that there is significant positive relationship between knowledge acquisition and creativity of schools managers (p=0.000, r=0.645); so creative increase, if knowledge acquisition increae. Result of peresent study is consistent with research result of Samadian & Seyed Alavi (2011); Abbasi Mosloo & et al (2009) and Liaeo & et al (2010). Results of researches show that there is significant positive relationship between knowledge acquisition and creativity. Also results of this research are consistent with research of Hedat & Moghadami (2008). Because their research results has shown that there is significant between Organizational learning especially knowledge acquisition with creativity and innovation. In explaining this finding can be said that use of vast resources of knowledge can be effective on creativity of schools managers.

Fourth hypothesis: There is relationship between knowledge organizing and creativity of schools managers.

The findings suggest that there is significant positive relationship between knowledge organizing and creativity (p=0.000, r=0.573); so creative increase, if knowledge organizing increae. Result of peresent research is consistent with Niaz Azari et al (2011); Samadian & Seyed Alavi (2011). Result of all of researches show that there is significant positive between knowledge organizing and creativity. In explaining this finding can be said that knowledge organization process with organizing vast set of the input knowledge to knowledge base and extract useful dimensions of knowledge for the use of creativity can be effective.

5. Fifth hypothesis: There is relationship between knowledge storage and creativity of schools managers.

The findings suggest that there is significant positive relationship between knowledge storage and creativity (p=0.000, r=0.601); so creative increase, if knowledge storage increae.

Result of peresent research is consistent with result of research Abbasi Mosloo & et al (2009). The results of these studies show that there is significant positive between knowledge storage and creativity.

In explaining this finding can be said that knowledge storage in the form of the appropriate codified with the help of technology tools can be effective in next use the knowledge to help create ideas and finally creativity.

6. Sixth hypothesis: There is relationship between knowledge dissemination and creativity of schools managers.

Research finding show that there is significant positive relationship between knowledge dissemination and creativity (p=0.000, r=0.532); so creative increase, if knowledge dissemination increae. Result of peresent research is consist with result of research Samadian & Seyed Alavi (2011); Abbasi Mosloo & et al (2009); Niaz Azari et al (2011); Hassan Beigi (2010). Researches results show that there is significant positive relationship between knowledge dissemination and creativity. In explaining this finding can be said that distribution of knowledge and sharing it can be one of effective dimensions of creativity.

7. Seventh hypothesis: There is relationship between knowledge application and creativity of schools managers.

Research finding show that there is significant positive relationship between knowledge application and creativity (r=0.590, p=0.000); so creative increase, if knowledge application increae. The results of present study is consist with result of research samadian & seyed alavi (2011); Niaz Azari & et al (2011); Abbasi Mosloo et al (2009). Researches results show that there is significant positive relationship knowledge application and creativity. In explaining this finding can be said that knowledge application by using the proper knowledge in new positions can be effective by reducing gap between the knowledge and creativity.

8. Step by step regression analysis: in step by step regression of knowledge management was entered the only score knowledge management variable in the model and other variables were excluded from the model because of their significance was not confirmed. Also knowledge management was able to explain 0.42 of variance (p=0.000, R<sup>2</sup>=0.424). Other variables could not to pass from criteria and didn't entere to model. Considering their significant amount was higher than 0.05, so they were eliminated from model. In explaining this finding can be said that knowledge management is the best predictor for creativity. In other words, total of factors togather (knowledge management) better than the each one of them alone was effective in enhancing creativity. According to confirmed main hypothses concluded that there is relationship between knowledge management and creativity of schools managers. Because creativity is one of the key skills of managers, therefore with strengthen this important can gain strengthening knowledge management skills of managers.

To develop knowledge management skills, encourage and support changes that are conducive to knowledge engagement and reconstruction should be a priority. With confirm sub hypotheses of research concluded that each of processes of knowledge management creation, acquisition, organization, storage, dissemination and application of knowledge with creativity has a significant positive relationship. This means that strengthen each process can have effective role in enhancing creativity of managers.

#### 6. Suggestions

## **6.1.** Suggestions based on research questions

According to the findings of this study showed a significant positive relationship between knowledge management and creative of schools managers, it is determined that Implementation of an integrated knowledge management system

is a priority in schools by the education organization. In this regard suggestions based on compare the results elements of knowledge management and mean table of questions is presented.

Comparing the elements of knowledge management was determined that knowledge dissemination component has achieved the lowest mean score and then knowledge storage is the lowest mean among the components. It is suggested:

- 1. The role of knowledge management for school principals should describe and the importance of knowledge sharing in achieving the goals of the organization to managers during training courses or administrative sessions should understand them.
- 2. In addition trying to establish atmosphere of trust and security, budget to encourage the managers who will share their knowledge or the knowledge acquired are properly used, should be considered.
- 3. Various technologies include work with Internet, internal network (intranet), e-mail, and databases and etc be trained in order to enhance skill acquisition, storage and sharing knowledge to manager.
- 4. Consider questions mean table showed that the value of knowledge sharing among employees hasn't a high place among the managers of schools. Therefore, in regard to knowledge sharing of their staff hasn't willing to apply powerful policies to prevent or oppose the staff to share knowledge. It is better manager in this field have received the necessary training and be making culture for them that they can along with creating trust and encourage the timely workers who will share their knowledge, they use from its legal powers to influence colleagues in order to knowledge sharing.
- 5. Observed that observance of copyright and intellectual property related to knowledge storage component the among school managers hasn't high value such a right to respect for someone who will respect and consider rewarding for them. It is suggested that in addition will maked culture in this field.
- 6. It was found that because values remain unknown knowledge sharing among school manager, they don't have tend to study and explore ways to overcome barriers to knowledge sharing that these cases can stemming and addition understanding causes of this problem and ways to promote a culture of sharing will be considered.

### 6.2. Suggestion to Other researchers

- 1. Investigation of other dimensions knowledge management with creativity of schools managers.
- 2. Investigation on other academic levels of managers and even senior managers of the departments of education.
- 3. Investigation on teachers and other school employees.
- 4. Repeating research in other communities

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